Chief Technology Officer for the City of Seattle and Director of the Department of Information Technology Re-Confirmation Questions

Questions:

1. What are some of the notable accomplishments for the Department of Information and Technology (DoIT) over the past four years?

The department's mission is to "make technology work for the City".

Despite the Great Recession and significant budget cuts, the City's core technology services, operated by DoIT, have high levels of reliability and availability. The public safety voice radio network is available over 99.999% of the time – just a few minutes of downtime a year. The City's core e-mail system, data networks, telephone networks are available more than 99% of the time. We print over million pages of utility bills a month, and answered almost 40,000 calls for help at the service desk, solving 59% of the problems over the phone.

We completed the multi-million dollar upgrade and conversion of over 10,000 City staff to Office 2010 and a new email and email archiving system on schedule and within budget. The Seattle Channel has been named "top municipal television station of the year" in 2007, 2008 and 2010. The City's website was #1 Best of the Web in 2001 and 2006 and will be a contender again for that honor in 2011. And working with other departments, we've driven dozens of applications and services to the web, ranging from utility bill payments to pothole maps to crime data.

But I'm most proud of the day-in, day-out, 24 hour-a-day, 365-day-a-year continued high performance by DoIT's skilled technology employees.

2. What are your major goals for the Department of Information and Technology over the next four years?

- Keep daily technology operations, services and networks "humming" (operating) at high availability and reliability, as discussed above.
- Drive more efficiency and effectiveness into City government by innovative use of technology. See answers to #3 and #5 below for more details.
- Help departments improve the outcomes of their major IT projects, making optimal use of limited funds and constrained staff resources.
- Continuously improve the way the City interacts with constituents. This includes
 innovative programming on the Seattle channel, more and better services on the
 web, better constituent participation using tools like "Seattle Speaks" and making
 government more transparent through innovations such as data.seattle.gov and My
 Neighborhood Map. It also includes innovative interactive apps on smart phones,
 tablet computers and the web.
- Help departments improve their services by making them more data-driven. This
 includes using information such as that found on data.seattle.gov to design and

- evaluate programs, but it also includes helping departments "crowdsource" data and information from customers and constituents.
- Improve the quality of life for the people of Seattle through better use of
 information technology. This includes continuing our community technology
 programs and tech matching fund, re-negotiating the Comcast cable TV franchise,
 and helping to bring high speed fiber broadband to neighborhoods.

3. What do you see as the primary challenges facing your department in the next four years?

- The budget and staffing of the department have been reduced from \$59 million and 217 employees to \$49 million and 195 employees over the past three years. We are not investing sufficient dollars to properly operate, maintain and replace our technology infrastructure. Yet City government is more dependent than ever on technology to deliver virtually every City service. We need to think creatively about how to meet the upcoming changes in technology and needs of departments.
- Individual City departments continue to make technology decisions in the context of their own department, without referencing or considering efficiency or the costs to the City government as a whole. Here are some specific examples:
 - City departments continue to independently procure software which performs the same or similar functions. For example, the City government operates at least four project management software systems from four different vendors.
 - The City government continues to operate at least three separate voice radio networks, with separate radio sites (towers), switches, infrastructure and both handheld and vehicle-mounted radios. This means it can be difficult for the departments to coordinate work with each other, and the City government pays for duplicate costs in labor/staffing and equipment.
 - City government operates three separate information technology help desks (City Light, Public Utilities and DoIT for the rest of City government).
 - There are many other examples.
- Management of technology projects by departments continues to be a struggle, with many projects failing to meet scope, schedule, and/or budget targets. See more detail in the answer to question #11 below.
- Cybersecurity threats to City information technology assets and infrastructure continue to evolve and become more virulent. Maintaining technology that is resistant and resilient will continue to require focus and resources.
- Consumer smart phones, tablet computers. We will increasingly see both
 constituents and employees using these devices, and we need to embrace them as
 tools to improve the productivity of employees and new ways to deliver services to
 constituents.
- 4. How have you ensured that Councilmembers and our staff have received the information we have needed from your department to make policy and financial

decisions?

We've built a budget and responded to Council requests and statements of Legislative intent, as well inquiries from Council members, their legislative staff and the central staff. Occasionally I've met personally with Council members to brief them on significant technology projects, such as the upgrade to Microsoft Office 2007 or the implementation of the new Police Computer Aided Dispatch (CAD) and Records Management (RMS) systems. I am open to improving this communication through the means or methods which the Council would find most useful. Such methods might include:

- Briefings on relevant topics at the Monday Council open meeting times;
- Briefings at the beginning of ECTR meetings;
- A regular written report from the Chief Technology Officer.

5. What opportunities do you see for improving collaboration between your department and other City departments?

The opportunity here is not so much collaboration between DoIT and other departments, but rather what kinds of technologies the City and DoIT can implement to improve the way all departments work together on behalf of the people of Seattle.

For example, over the past five years DoIT led a team of City technology professionals with support from outside vendors to implement Microsoft Office 2007 and Microsoft Exchange/Outlook for electronic mail across all departments. Electronic mail is, arguably, the most important automated tool in use by the City government today. Almost every City employee uses electronic mail; it is the primary communication tool between employees and departments; and it is the primary communication tool between constituents and their elected officials and City departments.

Are there other collaboration tools which we could implement which would improve the way departments work together and work with the public? Yes, absolutely, and here are a couple:

- Microsoft SharePoint. SharePoint allows employees to easily set up interdepartmental teams and share information (documents, spreadsheets, PowerPoint, Facebook-like "walls") with each other. It also allows sharing files between governments. For example, the City's Office of Emergency Management has a \$5 million catastrophic planning grant for an eight-county region and is coordinating that work through an external SharePoint site.
- Constituent Relationship Management (CRM) software. This project was funded by the Council in the same package as Microsoft Office 2007 and the Exchange/Outlook e-mail upgrade. The Finance and Administrative Services department will implement CRM this year. If embraced and used, CRM almost certainly this will improve the way constituents can request services or report problems to City government via the telephone, web, smart phone apps and in other ways.
- City budgeting software. Right now the City's budget is built through a variety of

different means. Some departments use antiquated specialized software, some use homemade software written by City employees and others use highly specialized budgeting software called "spreadsheets". None of these software packages directly link to the City's financial management system ("Summit") or its human resource management system (which does payroll and benefits). A major United States City with \$3.5 billion dollars in revenues and expenditures should have a better system for budgeting.

• Content management system. The City government has a phenomenal and award-winning website in www.seattle.gov. Yet almost everything posted or created here is done manually. That is, if a web page such as neighborhood service center hours has to be changed (http://www.seattle.gov/neighborhoods/nsc/), the Department of Neighborhoods has to recognize the needed change, but then an information technology professional needs to actually make the change. Most cities and counties and private companies use a content management system so individual employees with a minimum of tech knowledge can make such changes directly.

These are examples of the way collaboration can be improved. Both a SharePoint implementation and a content management system can be done at without major software investments, but will require significant labor investment.

- 6. How have you been promoting intergovernmental relations? How will you continue to foster partnerships with other governments (e.g., local, state, federal) to develop good public policy? How will you work to ensure that Seattle's goals and priorities are reflected in regional projects?
- I encourage DoIT's senior management to stay active in intergovernmental organizations. For example, Deb Schlenker is on the Board of the Washington State Association of City/County Information Services (ACCIS), and Mike Hamilton, our Chief Information Security Officer, regularly attends ACCIS and is active with State of Washington and Department of Homeland Security cybersecurity initiatives. Hamilton works with the nationwide State, Local, Tribal and Territorial government coordinating council, which is focused on critical infrastructure protection and resilience, and that group's meeting will be in Seattle this spring.
- I was President of the Metropolitan Information Exchange (MIX) for 2009-2010. MIX is the leading association of City/County CIOs, with 60 CIO-members from jurisdictions such as Los Angeles, Philadelphia, Washington DC, and Las Vegas. I brought the group's conference to Seattle in 2008.
- I helped launch a regional project to upgrade and replace the region's public safety radio networks, most of which were designed in the 1980s and built in the 1990s.
 These networks include over 23,000 radios in use by police, firefighters, EMTs, public works, transportation and other responders in a four-county region. I serve as the City's representative on a multi-county steering committee chaired by Fred Jarrett, Deputy King County Executive.
- I have been appointed to the FCC's Public Safety Advisory Committee which is

supporting the FCC's work to build a nationwide public safety wireless broadband network. I chair the group of 20 jurisdictions nationwide which have received authority to build such networks. These jurisdictions include New York City, New Jersey, Los Angeles, the San Francisco Bay area region, the States of Iowa and Mississippi.

7. What have you accomplished in the past, and what improvements are you working on for the future in the area of customer service?

Our primary customers are the other departments of the City government. The answer to question 1 illustrates some of the ways DoIT has met the needs of City departments.

We have multiple intra-City-government groups which help maintain and improve customer service, i.e. the Technology Board, which is the group of 13 IT directors and managers of the major departments. It helps me set policies and standards for technology use, and shares information. The Service Management Board coordinates the work of the service (help) desks in the departments. The Internet Board coordinates and standardizes the work of web professionals.

We also have customers who are constituents – the people who use the City's website and the Seattle Channel, those who benefit from the Community Technology programs and who can engage the Cable Office to improve their cable TV service. But we also have improved customer service by implementing a new electronic mail system (constituents use electronic mail to engage government), continuously upgrading our telephone and contact center technologies, and innovating with services like data.seattle.gov.

8. How do you conduct outreach to neighborhoods?

Examples of DoIT outreach:

- DoIT staffs the Citizens' Technology and Telecommunications Advisory Board (CTTAB) advises DoIT, the Council and the Mayor on technology matching fund grants, broadband implementations and public access television.
- The Seattle Channel regularly highlights issues of interest to neighborhoods and neighborhood history and events with programming such as City Inside/Out, Askthe-Mayor, City-Inside-Out Council Edition, CityStream, Community Stories and many other programs.
- The City's website <u>www.seattle.gov</u>, managed by DoIT, is the City government's primary vehicle for reaching communities, giving them information and allowing them access to online services.
- The Technology Matching Fund (TMF) program makes over \$200,000 in grants a year to non-profits to help bridge the digital divide.

However, for the most part, the Department of Information Technology <u>enables</u> other departments to do such outreach by having an award-winning website and Municipal Television Channel.

9. How is your department addressing issues of the evolving workforce of the future, such as filling positions vacated by aging City workers, and welcoming more people of color, women, and people with disabilities to the City workforce where they may not have been traditionally represented in large numbers?

The Department of Information Technology has an active recruiting strategy to both retain institutional knowledge and broaden our efforts to increase the diversity in our candidate pools. In our recent budget cuts, we have been able to reassign several DoIT employees in other positions to avoid layoffs, and we have interviewed and hired City employees from other City departments. We strongly support the Project Hire program and have two staff serving as PH case managers. We have a robust RSJI Workplan to implement strategies to address workforce equity. Some of the items on our RSJ Workplan include a cross training program to increase skills between our Service Desk and Technical Support staff, training for HR staff with a focus on diversity in recruiting methods, and training for individuals on interview panels. Additionally, we have an intern program that encourages non-traditional students re-entering the workforce, and have two supported employees on staff.

10. How have internal operations in your department improved over the past four years? What are your goals for continuing to improve the internal operations of your department? What are the management challenges that you face?

Over the past four years, the size of the department has dropped from 217 employees to 195. We've eliminated a number of management and strategic advisor positions, as well as para-professional staff. I've tried to conserve the number of technical staff, but in 2010 we lost at least 5 such positions as well. At the same time, management salaries have been frozen or cut for several years. Management is working harder, but the workload has only increased because the City government has become more and more dependent upon technology.

We've tried to improve and standardize the practices and technologies we use.

On the practices side, DoIT and other departments have tried to adopt the Information Technology Information Library (ITIL) best practices for problem, change and service management. ITIL is the recognized worldwide standard for IT management.

On the technologies side, we've standardized software such as Microsoft Office 2007, Microsoft Outlook/Exchange for e-mail, and Microsoft Active Directory for managing userids and permissions/access. We are now implementing new anti-virus software Citygovernment wide, as well as "certificate management" software to allow us to encrypt data on laptops and enable secure e-mail messages. We are also implementing Microsoft's configuration management tool, which will allow much easier management of software on desktop computers, i.e. regular patching and upgrading, plus license tracking.

Unfortunately, these implementations sometimes become a "herd the cats" exercise. Some departments actively resist using the standard software platforms, saying they do not have the staff or budget to implement the software, or saying their needs are "unique" from the rest of City government, hence they must implement their own service or

software.

11. How do you approach making decisions about maintaining the City's infrastructure? How do you ensure that capital projects are completed on time and on budget?

Increasingly, decision making is driven reactively, not proactively, e.g. which equipment or system is in danger of failing? Furthermore, technology changes are moving so rapidly in the outside world that our decision-making is often driven by outside factors such as smart phone and tablet adoption, and social media. Or we find ourselves unable to adopt new technologies (e.g. Internet Explorer V9) due to constrained resources and our older, legacy systems.

Managing IT projects has historically been a challenge. Following the difficulties of implementing the utilities' customer service system in 2001 (it was a year late and \$14 million over budget), we established a "project management center of excellence". Every department is supposed to identify its large (over \$100,000) technology projects to my office, and we evaluate them for risk. We then establish project oversight and require monthly reporting of status. While some departments take project management seriously, others continue to struggle. Over the last four years, 66 large IT projects have finished. Of those, 72% were close to meeting their budget, but only 55% delivered on their results and less than 40% met their schedule.

However individual project managers and employees in departments, and some departments as a whole, continue to resist project oversight and sound project management practices.

Many of the budget cuts DoIT has taken over the past three years have reduced our ability to provide for replacement of the City government's network and technology infrastructure. I hope we can adopt a targeted funding strategy for specific upgrades and improvements, such as those discussed in the answers to the questions above.

12. How does your department approach contracting decisions so as to give ample opportunity for women-owned, minority-owned, and disadvantaged businesses to participate?

We've focused a lot of effort in this area and had significant success. In 2005, DoIT's WMBE utilization was 4.77% and 19 vendors. For the past four years, we've been over 13% and 40+ vendors.

Our staff regularly attends trade shows, forums, business alliance meetings and the like in an effort to reach WMBE businesses. We set up individual meetings between WMBEs and DoIT Division Managers who might be able to utilize their services and we provide regular periodic internal training to DoIT staff on finding and using WMBE businesses.

We participate on the citywide WMBE Interdepartmental Team and were recognized by them in 2010 as having a very successful WMBE Program.